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LOPHODERMIIUM INFECTANS MAYR A SYNONYM OF HYPODERMA ROBUSTUM TUBEUF

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(WITH 1 TEXT FIGURE)

When Mayr, in the latter part of the last century, made a trip through the forests of North America he collected or observed a number of parasites which he later named in his book (1) on these travels, but without describing the organisms, so now it is difficult and in some cases impossible to determine just what he has recorded, since the only clue to the identity of the parasite is the host on which it occurs.

Among his collections was a needle-inhabiting fungus parasitic on white fir (*Abies concolor* (Gord.) Parry) in the San Bernardino Mountains of California. The perithecia and spores which appeared on needles from 2 to 6 years old were not mature, according to Mayr's statement, in this collection made in November 1887. He named the fungus *Lophodermium infectans* n. sp. without describing it. Tubeuf (2, p. 16) who later studied some of Mayr's collections did not find this parasite among them, but did find a fungus belonging to the same family, Hysteriaceae, on a species of fir, but the material was without label. Tubeuf decided the host was *Abies concolor* and described the parasite as a new species, *Hypoderma robustum*. The genus *Hypoderma* was formerly included in *Lophodermium*.

Among duplicate collections from the Farlow Herbarium of Harvard University received by the writer through the courtesy of Professor Roland Thaxter was one labelled "*Lophodermium infectans* Mayr on *Abies concolor*. Type of Mayr. See his Waldungen." As far as can be ascertained this material came to Dr. Farlow directly from Mayr. A study of the collection shows the fungus to be the same as Tubeuf named *Hypoderma robustum*. The measurements of the spores without the gelatinous sheath as given by Tubeuf were $3 \times 30-36 \mu$, while in the

collection from the Farlow Herbarium 50 spores ranged from $3-7 \times 18-34 \mu$ with an average of $4 \times 29 \mu$, not a significant



FIG. 1. Asci and spores from the collection of *Lophodermium infectans* received from the Farlow Herbarium.

difference. Asci and spores from this collection are shown in figure 1.

From the foregoing it seems highly probable that the collection studied and described by Tubeuf was originally labelled *Lophodermium infectans* by Mayr but the label was later lost. The only doubt is Mayr's statement that the fungus was not mature when he observed it, but it is not unusual when examining these fungi to find both mature and immature perithecia in the same collection. Since Mayr's name is a nomen nudum, *Hypoderma robustum* Tubeuf stands.

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- (1) Mayr, H. Die Waldungen von Nordamerika. xii + 448 pp., 16 figs., 12 pls., Munich. 1890.
- (2) Tubeuf, Carl von. Studien über die Schüttekrankheit der Kiefer. In Arbeiten aus der Biologischen Abtheilung für Land- und Forstwirtschaft am Kaiserlichen Gesundheitsamte, v. 2, no. 1, pp. i-ii + 1-160, figs. 1-32, pls. 1-7. 1901.



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